

Short Manual for ElvaX Art

Study the operating manual carefully before the usage of spectrometer ProSpector. You should provide the radiation safety and carry out the customer training before the application.

Spectrometer is a source of X-ray radiation used to analyze samples.

Therefore before starting operation it's necessary to ensure that all safety requirements are observed and users of the spectrometer have been trained:

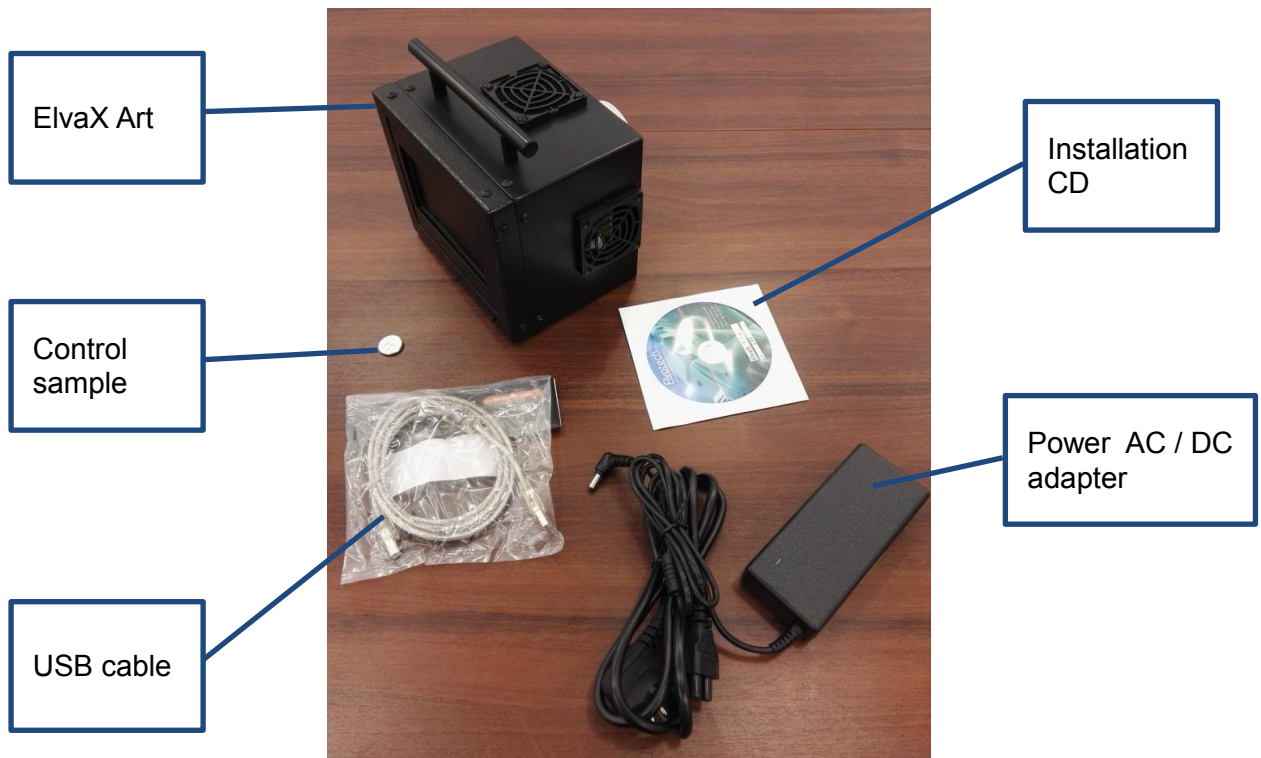
- Do not allow any unauthorized persons closer than 1 meter to the primary X-ray beam emanating from the snout of the spectrometer.
- Never point the X-ray beam on yourself or anyone else. Do not cover the detector with your fingers or other body parts.
- Ensure a snug fit of the spectrometer to the test object during the time of measurement.
- To reduce radiation scattering keep the spectrometer at the right angle (90°) to the sample.

Do not cover the sampling window of the spectrometer with any body parts and never direct the instrument at people. This may cause irradiation!

When using the device, be careful that the sharp object does not fall into the measuring window.

Exercise extreme caution - the entrance window of the detector is close, whose damage cannot be repaired and entails detector replacement (if the detector is damaged spectrometer guarantee does not apply)!

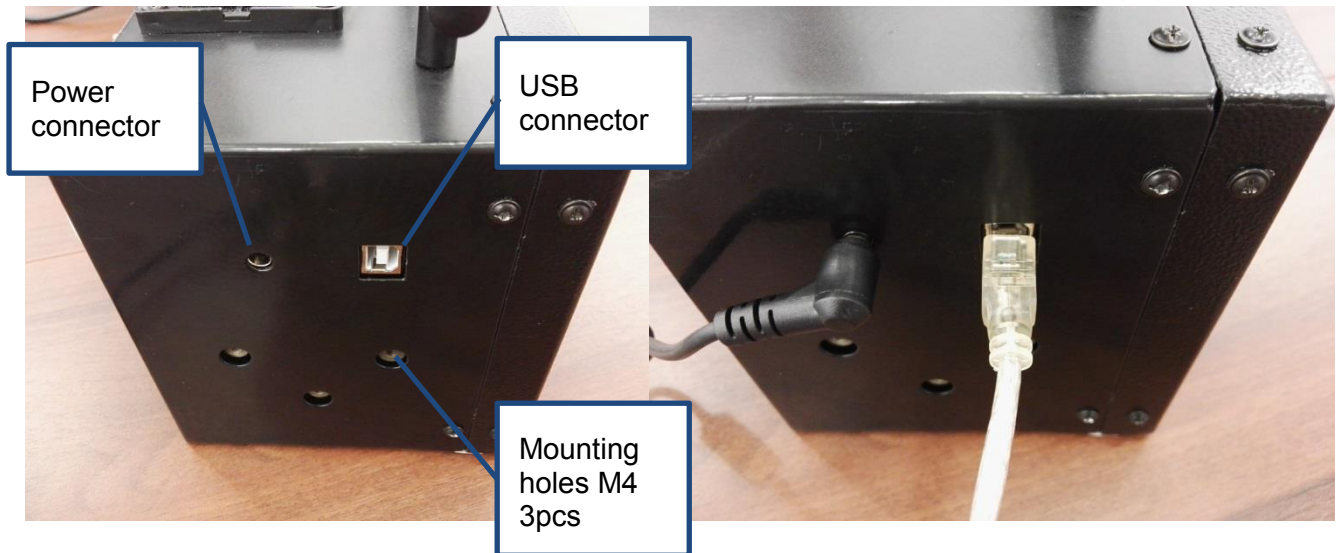
1. Unpack the instrument. Check the delivery set.



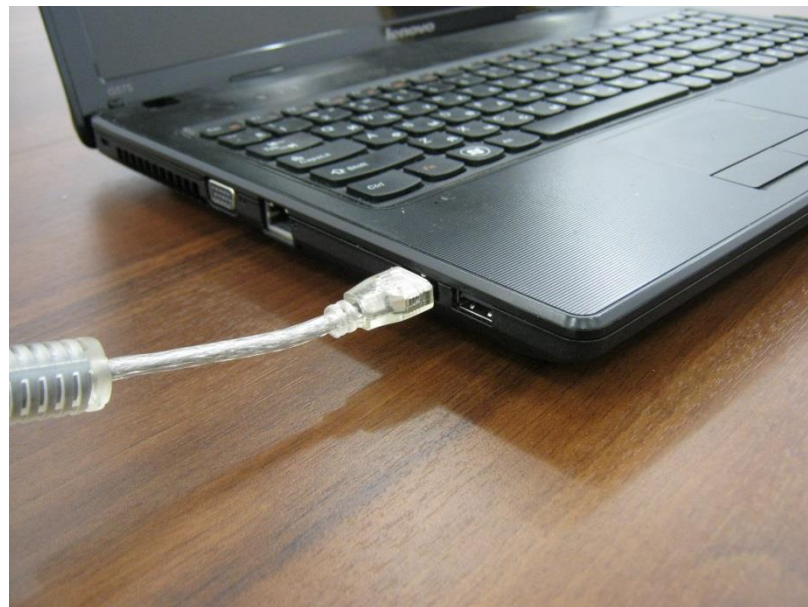
2. The instrument is designed for operation in closed heated (or cooled) premises with conditioned or partially conditioned air. Operation conditions:
 - ambient temperature from 10 to 25 °C;
 - relative humidity up to 80% at 25°C;
 - atmospheric pressure from 84 to 106.7 kPa.

Therefore after transportation the instrument can be operated only when its housing gets the required temperature. Turning on the instrument, which has just been brought from a cold environment may lead to inoperability!

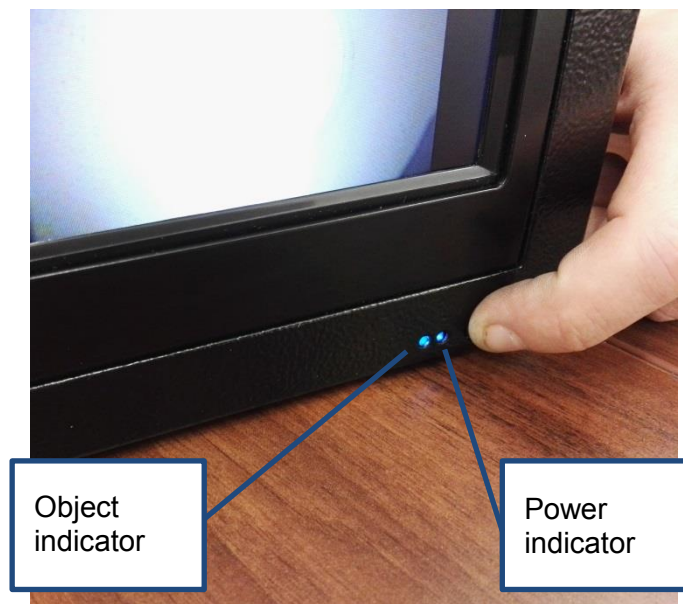
3. Connect the AC cable and USB cable to the instrument. The device can be mounted to a standard pantograph by means of 3 screws M4.



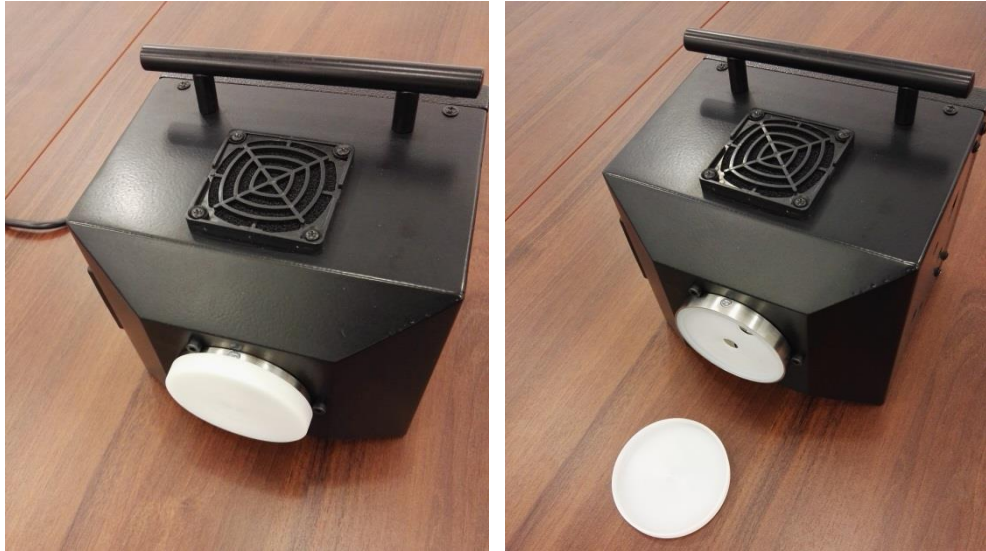
4. Connect the USB cable to a computer.



5. Turn on the computer and use the CD in the delivery set for installation of ElvaX software.
6. Turn on the instrument. Measurement may be started 10 minutes after the instrument turning on (operating mode setting time).



7. Remove protective cover from measuring window.



8. Place the device on the object of research, controlling the image on the device screen. Measurement window plane must closely adhere to the object. Check the work of the object sensor. When the instrument is brought to the object, the color of the object indicator should change from green to blue.



9. Run ElvaX software and make measurement. When the X-ray tube is turned on, the object indicator changes color to red.

